REMARKS

Claims 1-20 are in the present application, claims 2 and 21 being cancelled.

Claims 1 & 2 been combined to a more specific claim than original claim 1 and no new matter has been added. Also former claims 2 & 21 have been cancelled to limit the issues.

The Office Action rejection of claims 1, 3, 4, 6, 12, 13 & 14 as anticipated under 35 U.S.C. 102 (e) view of the Schwarz patent ('388) is respectfully traversed. Schwarz discloses aqueous solutions of under-oxidized, non-energetic ionic liquids and water for use as ink. But such ink solutions do not suggest the oxygen-balanced, highly energetic, single-phase, ionic-liquids of the invention.

The Office Action rejection of claims 1-5, 17, 18 and 21 as anticipated under 35 U.S.C. 102 (b) in view of the Wagaman patent (' 388) is respectfully traversed. Wagaman also discloses aqueous solutions of severely under-oxidized materials. The statement by the Examiner that ethylammonium nitrate is oxygen balanced is incorrect. Its composition of $C_2H_8N_2O_3$ allows only for the combustion of 6 of 8 hydrogens and leaves all the carbon unburned. All the other compounds of Wagaman's claim 11 have an even worse oxygen balance. In addition, the composition of Wagaman's claim 11 contains 5-50 weight% of dead water. Applicants would like to see a rocket fly with such a propellant.

Also, in both cases, the use of solvents (water) results in significant vapor pressure and can result in the precipitation of solids or phase separation on evaporation, of some of the solvent or upon cooling of the solution. Thus, the performance of these systems as propellants is believed far inferior to that of the claimed invention.

Accordingly, the statement by the Examiner that Schwarz discloses an "energetic" material is believed unfounded. All of the compositions of his claim 11 are so severely under-oxidized that they would seem worthless as monopropellants. That is, the small anions do not carry sufficient oxygen for complete oxidation of the large fuel cations, resulting in poor performance. By contrast, the invention provides, per claim 1, ionic liquids having fuel cations and oxidizer anions that are substantially oxygen balanced, resulting in high performance.

Moreover, claim 1, as amended herein, is directed to *ionic liquids*, that is, a liquid of single composition. If another liquid, including water, is added to the original composition, it is no longer an ionic liquid but an aqueous solution where composition changes can occur to the

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detriment of performance, as indicated above. On top of that, the above prior art aqueous solutions are under-oxidized, as discussed above.

It is noted that the above Office Action refers to claims 7 & 9 as "objected to... but would be allowable if". In view of the above discussion of the applied art and of the combination of former claims 1 & 2 into a more detailed new claim 1, it is believed that such claim 1, as amended, provides an allowable base claim for all of its dependent claims, including claims 7 & 9.

In view of the foregoing, the claims of record, as amended, are believed distinguished over the applied art and condition for allowance.

Respectfully submitted,

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